Bulk Property in a Region due to Advection and Diffusion $Pe_n = Pe_p = Pe$ 1.0 Dimensionless Property ((λ - $\lambda_{\rm n}$)/($\lambda_{\rm p}$ - $\lambda_{\rm n}$)) 8.0 0.6 $\frac{1}{1}$ /(1 +e^{-Pe/2} 0.4 0.0 -15 -1010 15 Dimensionless Material Flow Rate (Pe)